

# SIGHTTRACKER PTZ INSTALLATION GUIDE

---



**For Support Resources:**  
<https://portal.sightlogix.com/help>

SightLogix, Inc.  
745 Alexander Rd  
Princeton, NJ 08540

[www.sightlogix.com](http://www.sightlogix.com)  
[support@sightlogix.com](mailto:support@sightlogix.com)

April 2023

SightLogix, SightSensor, and SightMonitor are registered trademarks of SightLogix, Inc. All other trademarks are the property of their respective owners.

SightLogix is a licensee of the GNU General Public License (GPL). You can request a copy of the GPL-licensed source code used in this product from SightLogix' sales office. No part of this document may be reproduced or transmitted in any form or by any means, electronic or mechanical, for any purpose, without the express written permission of SightLogix.

The information in this document is distributed on an "as is" basis and without warranty. While every precaution has been taken in the preparation of this document, SightLogix assumes no responsibility for errors or omissions or for any damages resulting from the use of the information contained herein.

## Warnings and Cautions



### Warning!

If mounting the device on a pole, tower or any elevated location, use industry standard safe practices to avoid injuries.



### Caution!

Except as described in this manual for wiring the back panel, do not open the SightLogix device for any reason. Always handle the device with care to avoid damage to electrostatic-sensitive components.

Prior to making any connections, ensure the power supply or circuit breaker is switched off.

Operating the device outside of the specified input voltage range or the specified operating temperature range can cause permanent damage.

Always ensure that your SightLogix device is properly grounded. Failure to properly ground the device can lead to permanent damage. Typical to good grounding practices, the device ground should be connected to the lowest resistance path possible. You can learn best practices to protect your SightLogix equipment at <http://www.sightlogix.com/surge>.

# TABLE OF CONTENTS

	<u>Page #</u>
<b><i>Getting Started</i> .....</b>	<b>1</b>
General Information .....	2
<b><i>Installing Your SightTracker PTZ</i> .....</b>	<b>5</b>
WebConfig Overview .....	11
<b><i>WebConfig Reference</i>.....</b>	<b>25</b>
NETWORK Page Parameters .....	26
DEVICE Page Parameters .....	27
PTZ Page Parameters.....	29
Live View Page .....	30
ASSOCIATION Page Parameters .....	31
CALIBRATION Page – Basic Calibration Parameters.....	32
MPEG / JPEG Page Parameters .....	34
WEB SERVER Page Parameters .....	35
MAINTENANCE Page Parameters .....	36
INFO Page Parameters .....	37
CAMERA NEIGHBORHOOD Page Parameters .....	39
ONLINE HELP .....	39
LOGOUT.....	40
<b><i>Troubleshooting and More Information</i>.....</b>	<b>42</b>
Factory Rest Procedure .....	43
Installing the SightLogix Self-Signed Certificate.....	43
Finding More Information.....	50
<b><i>Mounting and Dimension Diagrams</i>.....</b>	<b>51</b>

## GETTING STARTED

## GENERAL INFORMATION

This guide describes the basic installation of SightLogix SightTracker PTZ devices. If you need help during the installation process, contact SightLogix at +1 609.951.0008 option 2 or [support@sightlogix.com](mailto:support@sightlogix.com).

All installers are encouraged to use the SightLogix Support Portal where you will find documentation, third-party integrations, and troubleshooting: <http://portal.sightlogix.com/help>.

### This installation guide includes the following topics:

- Mounting, wiring and powering the device
- Configuring your SightTracker PTZ
- Associating a SightTracker PTZ with SightSensor
- Calibrating your SightTracker PTZ
- Troubleshooting

For safety, and to achieve the highest levels of performance from your SightLogix system, always follow the warnings and cautions in this manual when handling and operating the device.

## SightTracker PTZ Overview

SightTracker PTZ is a smart, auto-tracking Pan-Tilt-Zoom (PTZ) digital video camera that aims, zooms, classifies, and tracks human targets that have been detected by an associated SightSensor smart thermal camera.

By utilizing the highly accurate detection provided by a SightSensor camera, and classifying the target using artificial intelligence (AI), SightTracker PTZ stays locked on the intruder as it moves throughout the site, even if it leaves the field of view of the original SightSensor's detection zone.

The result is a highly reliable, automated and up-close view of a target that has violated a site's security policy, providing critical situational awareness about the target's location and its activity as an event unfolds.

SightTracker PTZ devices will continue to track an object until one of the following occurs:

- Another target becomes higher priority. In case of multiple targets, the default is to assign the highest priority to the newest target. However, you can specify a different priority.
- The VMS operator takes control of the device. Joystick control from the VMS is always able to immediately take control of the device.
- The target leaves the field of view of the SightTracker PTZ's 33X zoom

Device connections are made to the harness on top of the PTZ in the SightLogix junction box.

The device can be powered with a conventional power supply using 24V AC/DC or (60W) POE++. An Ethernet connection is provided for IP video streaming.

## Installation Steps

Setting up a SightLogix SightTracker PTZ includes the following basic steps:

- In a bench test environment, unpack the device, connect 24VAC or POE++ power, Ethernet, launch a browser and connect to WebConfig at the default IP address (192.168.0.99).
  - Username: *root*
  - Password: *push2edg*
- Change the IP address from the default to your network requirements
- Set NTP
- Mount your device
- Associate the PTZ with a SightSensor
- Calibrate the SightTracker PTZ with a geo-registered map
- View video to confirm operation

## Required Materials

The installer will need to supply the following items:

- Power source:
  - (24VAC) Power cable for system power (2-conductor, w/shield, gauge determined by cable length and supply voltage), or
  - POE++ (60W) power supply or PoE switch if used for system power
- Cat5e Ethernet cable for digital video and/or PoE for system power
- Device mount (available for purchase from SightLogix), wall mount anchors, miscellaneous electrical hardware, connectors, and tools
- A PC with a 2 GHz dual-core processor with at least 4GB of memory running one of the following: Windows 7 Professional, Windows 10 (32-bit or 64-bit), or Windows 11 Professional; Windows Server 2003, 2008, 2012 (32-bit or 64-bit), or Windows Server 2019.
- Compatible web browser:
  - Microsoft Edge Version 41 or later
  - Chrome Version 63 or later
  - Microsoft Internet Explorer - Recent 2018 versions or newer
- IP network. Devices can connect to the network using copper wiring (CAT5e). 100MB and higher networks are required.

- Range of IP network addresses provided by the network administrator, including Port 80 open on your local network
- At least one SightSensor, calibrated using the GPS Map Calibration procedure as described in the "SightSensor WebConfig Installation Guide" (available at <http://portal.sightlogix.com/help/getting-started-web-config>)
- Geo-registered map and .info file, often supplied by SightLogix with your product.
  - If your product shipment did not include a site map, you can obtain aerial images from Google® Earth, SightLogix other providers. Instructions for using Google Earth to install a custom site map are here: <http://portal.sightlogix.com/help/google-earth>.

## **INSTALLING YOUR SIGHTTRACKER PTZ**

### Supplied materials

Your SightTracker PTZ will be shipped with the following items:

- Your PTZ camera
- Two (2) Allen wrenches for installation
- Wall or Pendant mount (optional, highly recommended)
- Junction Box (optional, highly recommended)
- Pole Mount (optional, as needed)
- Corner Mount (optional, as needed)
- Weather-tight gland for connection cables
- Info tag containing key setup information

### Installation Steps

We recommend performing initial setup on a work bench at ground level prior to mounting the device in its final location.



#### **WARNING**

- Your device will automatically rotate when first applying power; ensure the PTZ is supported by either the top connection point or the sunshield, so the pan and tilt stages are not impeded.

**1. Lay Your Device on its Side (Ensure Pan and Tilt Stages are not Impeded)**



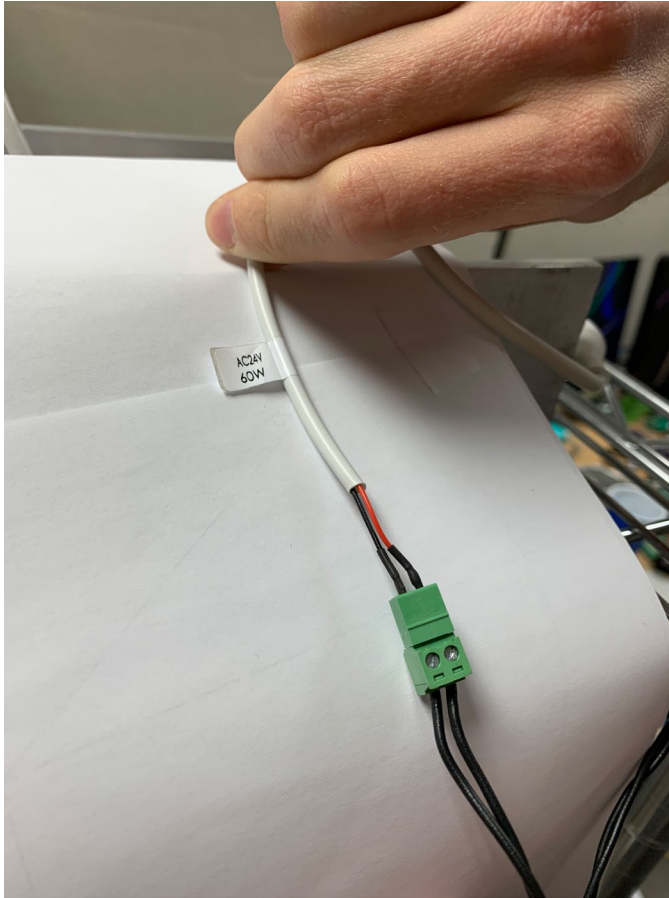
**2. Connect Your PC to the PTZ**

- On the PTZ, remove the connector head and connect an RJ45 cable
- Connect the Ethernet cable to a port on your computer.



### 3. Connect Power (60W POE++ or 24V)

- If using POE++ (60W) make sure power is being supplied by the Ethernet device which the Ethernet cable has been plugged into or a PoE power injector in the cable run leading to the device.
- If POE is not being used, connect 24VAC to the power cable (labeled 60W).

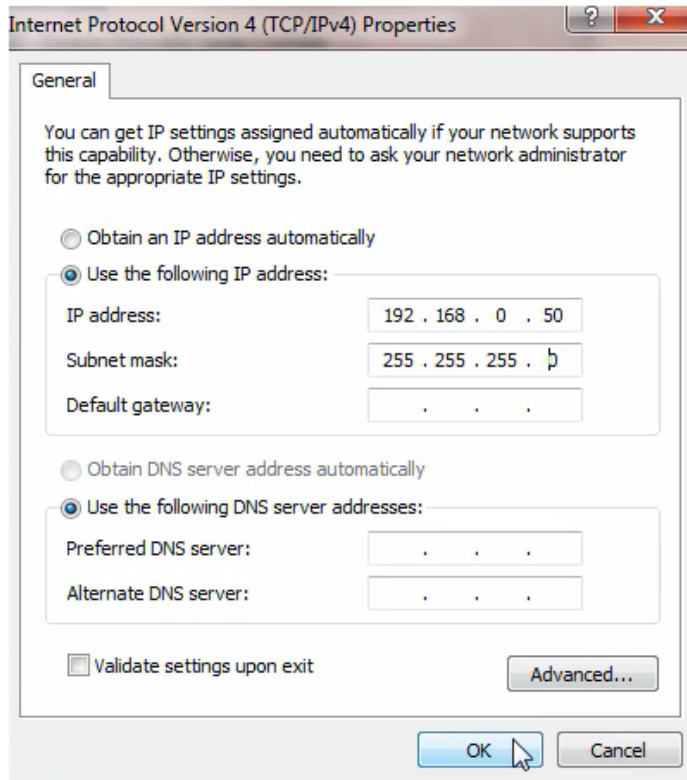


- Once power is supplied to the device, the PTZ Homing process is activated, and the camera will automatically spin.

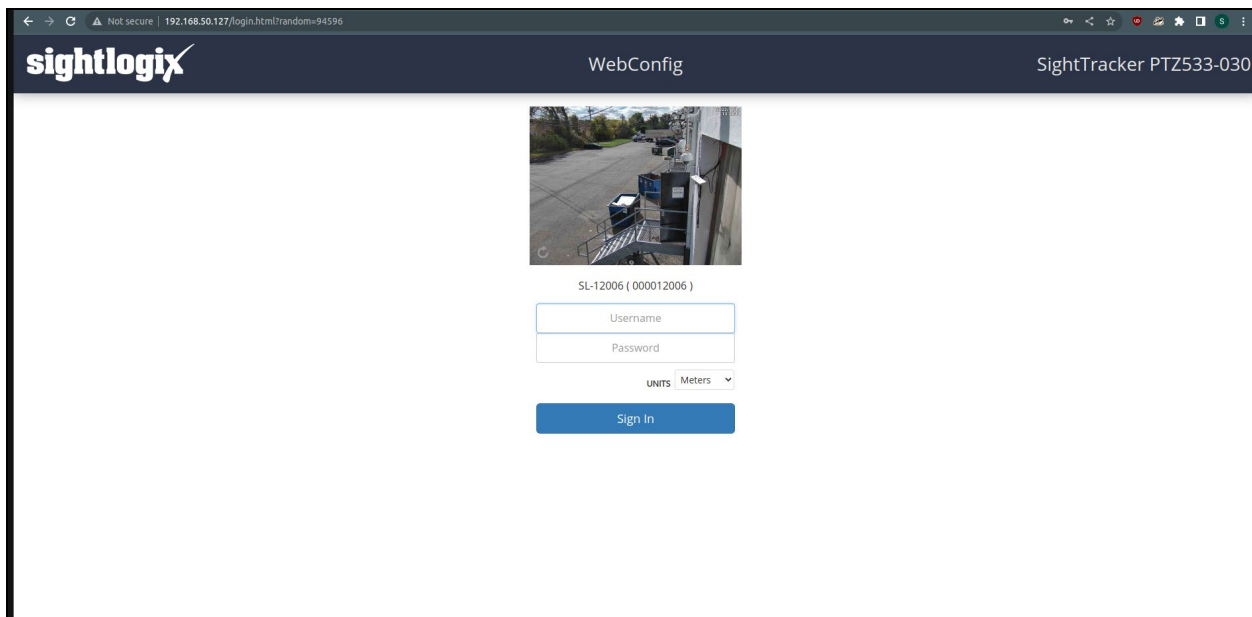
#### 4. Assign Your PC an IP Address in Device's Default IP Range

When first powered, the device will request an IP address via DHCP; if one is not assigned after thirty seconds, it will take on the default IP address: 192.168.0.99. In this case you will need to assign your PC an IP address in the device's default address range to continue.

- On your computer, open Network and Sharing Center
- Click "Change Adapter Settings"
- Click "Local Area Connection"
- Choose "Internet Protocol Version 4" and click "Properties"
- Click "Use the following IP address" and complete the fields. The example below can be used for a device that has the default IP address.



### 5. Launch a Browser and Enter IP Address (default is http://192.168.0.99)



**Note**

If you receive a security warning, you may have entered “https”, or your browser may be configured to only allow HTTPS. Retry the URL using **http:** or refer to *Installing the SightLogix Self-Signed Certificate* in the Troubleshooting section of this guide for instructions.

- Enter default username/password:
  - root
  - push2edg
- Set your default units (Metric or Feet) and click Sign In

## WEBCONFIG OVERVIEW

### Quick Start Guide

When you launch WebConfig, a Quick Start Guide shows basic steps to get you up and running.

- Close the window by clicking the “X” in the upper right.
- This pop-up returns at each login until you CALIBRATE your SightTracker.

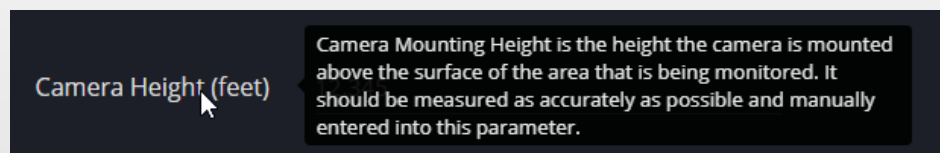
### Left-side Navigation



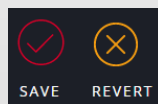
- Click the left arrow to collapse the Navigation menu for more configuration space.


### Tool Tips and Online Help

- Hover over any field name **or** field entry to see helpful information.



### Saving Parameters



- Entering new parameter(s) brings up SAVE/REVERT icon under the Page Menu.
- Changes made on a field's page but not yet saved are indicated by yellow text.
- Once parameter(s) are complete click “SAVE” checkmark circle to load new parameters to the device.
- To cancel new entry(s) click the “REVERT” X circle and the original entries will be restored.
- Checking either circle will cause  to appear in the upper right corner to acknowledge the action.

## 6. Click NETWORK to Change Settings

**NETWORK ( SL-12006 )**

Camera Name SL-12006 Serial Number 000012006

**Current Network Settings**

Fallback IP disabled

IP Address 10.254.254.137 Gateway 10.254.254.6

Netmask 255.255.255.0 NTP time1.google.com

DNS 8.8.8.8 Syslog

**Network Configuration**

Static ☒ ☐

IP Address 10.254.254.137 Gateway 10.254.254.6

Netmask 255.255.255.0 DNS 8.8.8.8

Syslog Optional Domain Optional

NTP time.google.com ☐ Custom

NTP Status

```

MS Name/IP address      Stratum Poll Reach LastRx Last sample
=====
** 216.239.35.0         1 10 377 1027 +210us[ +356us] +/- 12ms
Name/IP Address         NP NR Span Frequency Freq Skew Offset Std Dev
=====

```

### Set the IP Address

Now that your workstation can communicate with the device, you can change the IP addressing from the default.

- If DHCP is selected and DHCP service is available on the network an IP Address, Gateway, and Netmask will be assigned by the DHCP service.
- If STATIC is selected, complete the IP Address, Netmask, Gateway and DNS fields. If the internet is reachable public DNS servers can be used such as 8.8.8.8.

### Set NTP

NTP is required for SightTracker PTZ operation and for secure authentication to SightSensors. Both the SightTracker PTZ and SightSensor should use the same NTP server. Changing NTP reboots the device.

Two NTP options are provided:

- If Internet is available, choose a preset NTP from the drop-down menu.
- If you are running a local NTP server, choose Custom and enter its dotted-decimal IP address or hostname

### Mount Your SightTracker PTZ for Use

Once networking settings have been made and you can communicate with your device, remove power and network connections, and your SightTracker PTZ can be physically mounted for use.

These instructions assume the use of the SightLogix Mount and Junction Box, which is highly recommended.

- SightTracker PTZs can be wall mounted, convex corner mounted, pendant mounted, or pole mounted.
- Wall Mounts (PTZ-WMT) and Pendant Mounts (PTZ-PDM) will attach to the Junction Box.
- Pole Mounts (PTZ-PLM) or Convex Corner Adapters (PTZ-CXA) are attached to the Wall mount.
- For best performance, co-locate each SightTracker PTZ on the same pole or mount location as the associated SightSensor(s).
- Ideally, mount your SightTracker PTZ at seven (7) meters or higher.
- **Dimensions and mounting illustrations are available in the Addendum at the end of this guide**

#### 1. Feed the SightTracker PTZ Cable Through the Mount Arm



## 2. Connect the Mount to the SightTracker PTZ



- Use the provided 3mm Allen wrench to attach the mount to the top of the camera.
- Make sure to tighten the set screws evenly to a similar tension.

## 3. Mount the Junction Box

- Mount the Junction Box where you will install your SightTracker. Ensure the box is level.
- If using a Pole Mount Bracket or Convex Corner adapter, attach the adapter to the Junction box first (otherwise the screws will be difficult to access.)
- Run Ethernet and Power as required to the Junction Box.



#### 4. Run the PTZ Cable Through the Junction Box and Make Connections



#### 5. Connect the Mount/Door to the Junction Box

- Attach the tether to the anchor point and align the hinges.



## 6. Close the Door and Tighten Using 5mm Allen Wrench



You are now ready to calibrate and configure your SightTracker PTZ for use.

## Calibrating and Configuring Your SightTracker PTZ

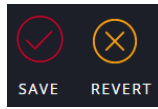
### 1. Open a Browser, Enter the IP Address of the Device, and Login

- Unless changed, default credentials are root/push2edg.

### 2. Click the PTZ Tab to Set Camera Behaviors

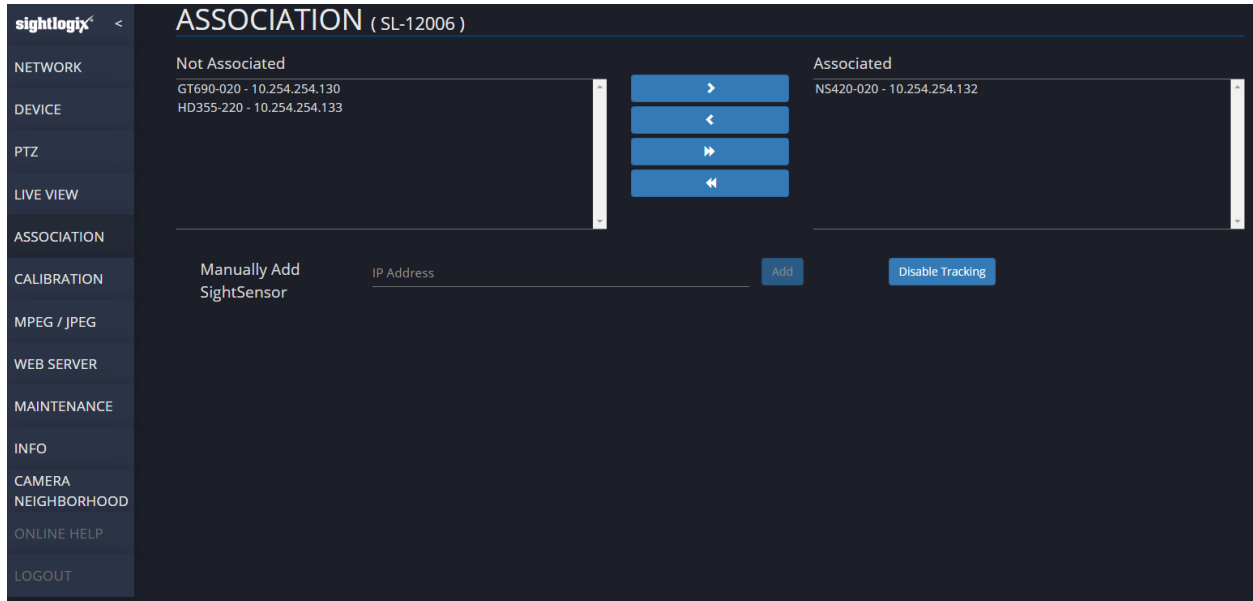
- Configure Tracking Behavior
  - Click the Idle Home Position button to return to the home position after 30 seconds of idle time (if desired). Click Set Idle Home Position to store the PTZ's current position as the home position (if desired).
  - Dwell Time: Enter the minimum number of seconds the PTZ will remain on a given target.
  - Reactivation Time: Choose the length of time after a user takes manual control before the SightTracker PTZ can follow targets.
  - Set the Target Priority drop down to prioritize targets followed:
    - Newer (default), Closer (closer to the PTZ camera), Faster, Bigger, Older, Farther, Slower, or Smaller.
    - In case of multiple targets, a SightTracker PTZ will track the newest one by default. If it's currently tracking a target and a new target appears, the PTZ camera will aim at the new target. Note that if two SightTracker PTZs are associated with the same SightSensor and are set to the same priority, they will track the same target even in the case of multiple targets.
- For Target Zoom, choose the degree of zoom used to follow targets (meters on the ground across the image).

- Click Auto Focus and/or Home to run those routines
- For Rehoming Time, choose the hour of the day that the camera will run a daily re-homing process to maintain accuracy (0-24). Changing this setting causes the PTZ to reboot.



- Click Save to store your settings

### 3. Click ASSOCIATION to Add SightSensors



- Select a calibrated SightSensor from the left, or control-click to select multiple cameras.
- Use the single arrow to move selected cameras or the double arrows to move all cameras from Not Associated to Associated (or from Associated to Not Associated).
- Alternatively, enter the IP address of a SightSensor to add it manually.
- Click Save.

#### 4. Click CALIBRATION to Calibrate Your SightTracker PTZ



##### ***Performing a Basic Calibration***

Basic Calibration associates a chosen location on a site map with the position and orientation of the PTZ.

You will need a georeferenced site map and .info file. This might be provided by SightLogix and shipped with your product.

If your product shipment did not include a site map, you can obtain aerial images from Google® Earth, SightLogix other providers. Instructions for using Google Earth to install a custom site map are here: <http://portal.sightlogix.com/help/google-earth>.

To perform a Basic calibration, do the following.

- Ensure that the Basic Calibration tab has been selected.
- Click the Show Map & Info button to reveal the Map upload options.
- Upload your .info file and JPEG using the Info File Upload and Map File Upload buttons.
- Once uploaded, click Use Map to store the information.
- Click Save.

The uploaded site map is displayed. Click/drag the map to reposition; use your mouse scroll wheel to zoom in/out.

- Click the Camera row from the Calibration Points table to turn the row RED.
- Enter your PTZ camera's height above the ground in the Height field.
- Click the sitemap at the location of your SightLogix device to place a RED camera pin and set its GPS location.

## Installing Your SightTracker PTZ

- A camera pin is displayed at that location and its current GPS coordinates are displayed in the Latitude and Longitude windows. Click at different locations in the site map to relocate the pin.

Calibration Points	Latitude	Longitude	Height (meters)	Pan	Tilt
PTZ	40.32302	-74.634375	3.353		
Point 1	40.322643	-74.634584	0	49.39	-4.04

Buttons: Import Position, Disable Tracking

### Next, calibrate your PTZ.

- Click Disable Tracking to prevent your PTZ from moving during your calibration process.

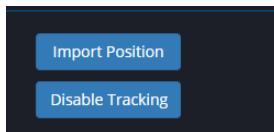
Calibration Points	Latitude	Longitude	Height (meters)	Pan	Tilt
PTZ	40.32302	-74.634375	3.353		
Point 1	40.322643	-74.634584	0	49.39	-4.04

Buttons: Import Position, Disable Tracking

- Click the Point 1 row in the Calibration Points table to activate it and turn it BLUE.
- In the site map, double-click at the location of a landmark on the map that will also be in your PTZ camera's field of view.
  - Choose a point at ground level next to a landmark or other permanent object and always select a point that can be easily identified in both the site map and the camera view.
- Click the Live View tab **LIVE VIEW** to see a live video feed of your PTZ.



- Click the window and drag the PTZ to the location of the landmark on the map selected in the previous step.
- Zoom to place the cross onto or as close to the landmark as possible for the most accurate calibration.
- Once your PTZ is zoomed on the image, click the Calibration tab to continue.
- On the Calibration page, click Import Position to load Pan/Tilt values.



- Click Save.

The heading of the table will be colored Green after the Calibration is complete.

Calibration Points	Latitude	Longitude	Height (meters)	Pan	Tilt
--------------------	----------	-----------	-----------------	-----	------

- Click Enable Tracking when done.

### ***Test your calibration.***

- Use Test Mode to confirm that your SightTracker PTZ is following targets detected by associated SightSensor.
  - Open a WebConfig session using the IP address of an associated SightSensor.
  - Click the CALIBRATION tab.
  - Click Test Mode button.

- Click a location in the SightSensor's Image at right.
- Confirm that your PTZ automatically positions on the target.
- If needed, you can improve your SightTracker PTZ's performance by adding a Pairwise Calibration, below.

### ***Performing a Pairwise Calibration***

The pairwise calibration more precisely aligns the GPS coordinates within the view of a dome camera with the GPS coordinates used to calibrate an associated SightSensor. This is an optional procedure but is recommended to:

- Associate more than one SightSensor with your SightTracker PTZ
- Address uneven terrain
- Improve SightTracker PTZ performance

Pairwise calibration associates three chosen points in the associated SightSensor image with the position and orientation of the PTZ Camera.

- Click Pairwise Calibration.
- Click Disable Tracking
- Select an associated SightSensor from the row. You will repeat for each one.

**Good Pairwise Calibrations are achieved by choosing widely spaced points that cover a large percentage of the SightSensor field of view.**

**Ideally, pick two points at the extreme ends of the path you expect targets to take (if applicable) and the third as widely spaced from the other two as possible, as shown.**



- Select Point 1 in the Calibration Points window. The row turns BLUE.
- Mark a point in the camera image.
- Using the Live View tab, zoom and orient the PTZ camera so the selected point is at the center of the image.
- Click Import Position.
- Repeat for Point 2 and 3.
- Click Save.
- The heading of the table will be colored Green after the Calibration is complete
- Repeat this process for each associated SightSensor.
- When done, click Enable Tracking (located on the Pairwise Calibration page for convenience; serves the same function as Enable Tracking on the ASSOCIATION page).
- Use Test Mode to confirm that your SightSensor and SightTracker PTZ calibrations are allowing targets to be tracked by your PTZ.
  - Open a WebConfig session using the IP address of an associated SightSensor.
  - Click the CALIBRATION tab.
  - Click Test Mode button.
  - Click a location in the SightSensor's Image at right.

- Confirm that your PTZ automatically positions on the target.

### 5. Add your PTZ camera to your VMS

- Connect your SightTracker PTZ as an ONVIF device.

***This completes installation of the SightTracker PTZ device for the most common settings.***

- Refer to the following section for a detailed overview of each WebConfig page and field option.
- Refer to the final section of this guide for troubleshooting.

## WEBCONFIG REFERENCE

## NETWORK PAGE PARAMETERS

**NETWORK ( SL-12006 )**

Camera Name  Serial Number

---

**Current Network Settings**

Fallback IP

IP Address  Gateway

Netmask  NTP

DNS  Syslog

---

**Network Configuration**

Static ☒ ☐

IP Address  Gateway

Netmask  DNS

Syslog  Domain

NTP  ☐

Custom ☐

NTP Status

```

=====
HS Name/IP address      Stratum Poll Reach LastRx Last sample
=====
** 216.239.35.0         1 10 377 1027  +210us[ +356us] +/- 12ms
Name/IP Address         NP NR Span Frequency Freq Skew Offset Std Dev
=====
  
```

**Camera Name** – Default enters device serial number in this field. It can be changed to a name for the device which will be displayed at the top of each WebConfig page. This might be a location identifier like “Front Admin Building” or another convenient identifier.

**Serial Number** – is read directly from the device and is unique to that device.

### Current Network Settings

**default isFallback IP** – If set to DHCP, and the SightTracker PTZ fails to get an IP address from a DHCP server within 10 seconds, the fallback IP will work as the IP address. Disabled by default.

**IP Address, Gateway, Netmask, NTP, DNS and Syslog** – are all parameters acquired from the network based on the device settings. They are listed here for convenience.

### Network Configuration

Network IP address selection is specified by either **DHCP** or a **Static** IP address. If DHCP is selected and DHCP service is available on the network an IP Address, Gateway, and Netmask will be assigned by the DHCP service. If a DHCP service is not available and no static IP address has been previously assigned the device will default after 30 seconds to a static IP address of 192.168.0.99. The device can be accessed using this address at which time the address can be changed and the appropriate Gateway and Netmask values can be assigned also.

**DNS** – this field is optional, but if the internet is reachable public DNS servers can be used such as 8.8.8.8 This field is entered in dot-decimal notation.

**NTP** – (Network Time Protocol) The NTP service is used to provide the device with accurate, synchronized, real-time clock information. While not necessary in all installations it is needed if the device is asked to coordinate selected local events, such as changing operational modes or enabling features in conjunction with the time of day. Also, secure authentication for ONVIF connections to a VMS may require it. NTP, if provided, can display date and time in the upper right-hand corner of the video.

The NTP Address field defaults to Custom where you can enter an NTP site address as a dotted-decimal IP address or hostname, or an address can be selected from the drop-down menu of the three sites listed where NTP service may be available (pool.ntp.org, time.nist.gov, or time.google.com) through Internet access if NTP service is not available on the local sub-net. Changing this parameter will cause a reboot of the device.

**Syslog** – is an (Optional) IP address of the machine on which the syslog server is installed. Knowing the syslog address allows the logging information created by the device to be accessed, which can be helpful for troubleshooting. Changing this parameter will cause a reboot of the device.

**Domain** – The Domain option specifies the domain in which to search to resolve names. It is only used when the device has a Static IP Address and is used in conjunction with a DNS Server to configure the device's DNS resolver.

**NTP Status** – NTP Status shows the internal state of the NTP service in the camera. This is an advanced debugging feature. More information is available by consulting ntp documentation "peers" command <http://doc.ntp.org/current-stable/ntpq.html>.

## DEVICE PAGE PARAMETERS

**Device Description** – is a description of specifics about this device which appears on the INFO page under Description. It can contain up to 1024 characters.

**Time Zone, Custom Time Zone** – If the NTP service is set up on the NETWORKING Page, then the Time Zone must also be setup to provide the proper local time corrections to “calculate accurate” sunrise/sunset’ corrections within that time zone.

**Day/Night Mode** –determines if and/or when the IR LEDs are active and the sensitivity setting of the visible imager (normal color, high sensitivity color, high sensitivity black & white).

The Day/Night Mode choices are:

**Day (LED off)** – imager is permanently set to normal low sensitivity full color with LEDs off

**Night with LED on** – imager is permanently set to high sensitivity black & white night mode with LEDs on

**Night with LED off** – imager is permanently set to high sensitivity color mode with LEDs off

**Schedule with LED on at night** – imager will automatically switch from full color day mode to high sensitivity black & white night mode with LEDs on at sunset, and back to low sensitivity full color with the LEDs off at sunrise. *(Note: NTP must be enabled for this mode to operate.)*

**Schedule with LED off** – LEDs will be permanently off, but imager will automatically switch from normal low sensitivity full color during the day, to low light full color mode at sunset, and back to normal full color at sunrise. *(Note: NTP must be enabled for this mode to operate.)*

*(Note: The “calculated time” for sunrise/sunset switching is a combination of the NTP time service, Time Zone setting, and the Camera GPS Location within its time zone.)*

**Sunrise Offset (min)** – used by scheduled day/night mode to offset the “calculated” sunrise switching times. Enter a number representing the number of offset minutes desired; a positive (+) number to delay (make later), or negative (-) number to move forward (make earlier).

**Sunset Offset (min)** – used by scheduled day/night mode to offset the “calculated” sunset switching times. Enter a number representing the number of offset minutes desired; a positive (+) number to delay (make later), or negative (-) number to move forward (make earlier).

### IR LED Brightness

**Near LED Brightness (%)** sets the percentage for near-distance IR LED (0=off, 100=Max)

**Far LED Brightness (%)** sets the percentage for far-distance IR LED (0=off, 100=Max)

## PTZ PAGE PARAMETERS

**Idle Home Position** returns the PTZ to the home position after 30 seconds of idle time.

**Set Idle Home Position** stores the PTZ's current position as the home position.

**Dwell Time** is the minimum number of seconds the PTZ will remain on a given target.

**Reactivation Time** is the length of time after a user takes manual control before the SightTracker PTZ can follow targets.

**Target Priority** drop down prioritizes targets: Newer (default), Closer (closer to the PTZ camera), Faster, Bigger, Older, Farther, Slower, or Smaller.

In case of multiple targets, a SightTracker PTZ will track the newest one by default. If it's currently tracking a target and a new target appears, the PTZ camera will aim at the new target. Note that if two SightTracker PTZs are associated with the same SightSensor and are set to the same priority, they will track the same target even in the case of multiple targets.

**Target Zoom** sets degree of zoom used to follow targets (meters on the ground across the image).

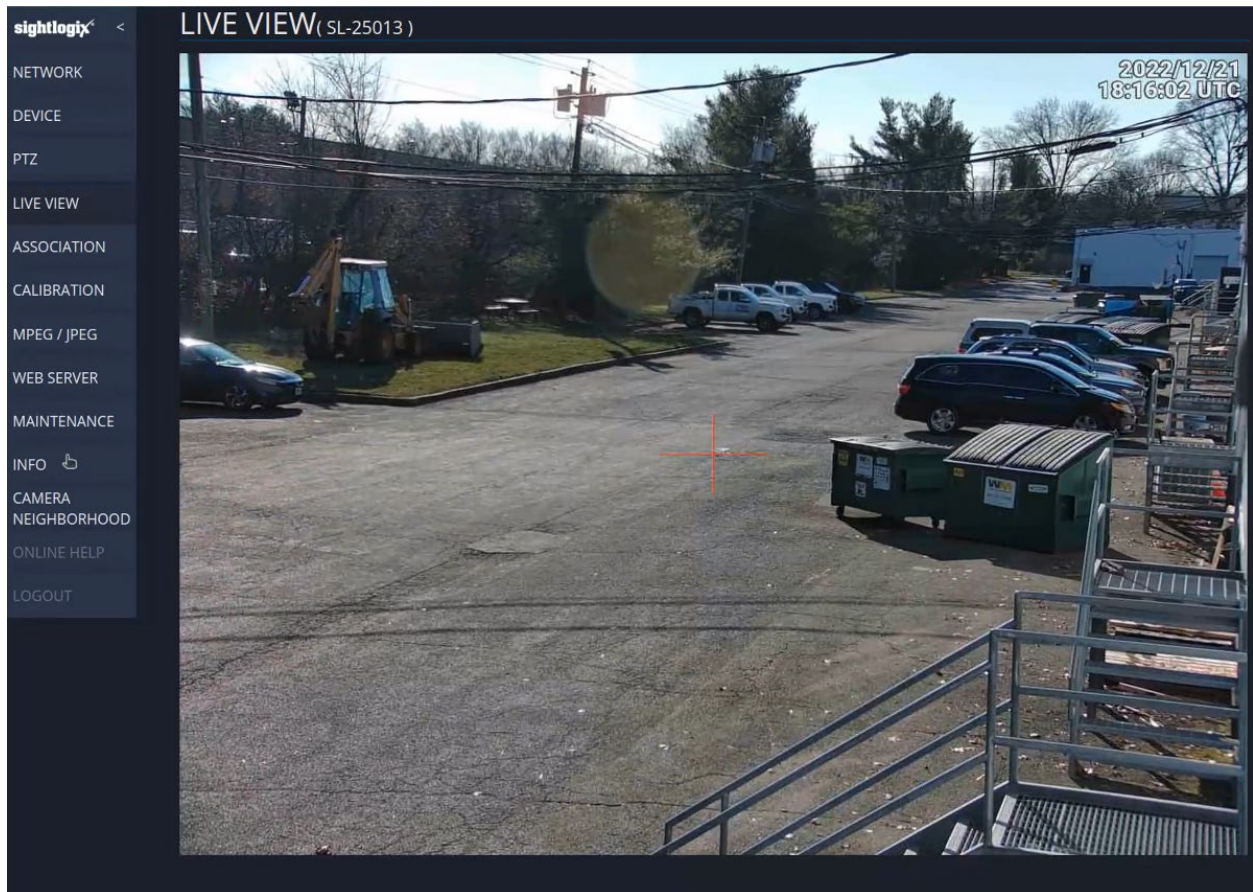
### PTZ Control

**Autofocus** runs the Autofocus routine.

**Home** runs the homing routine.

**Rehoming Time** sets the hour of the day that the camera will run a daily re-homing process to maintain accuracy (0-24). Changing this setting causes the PTZ to reboot.

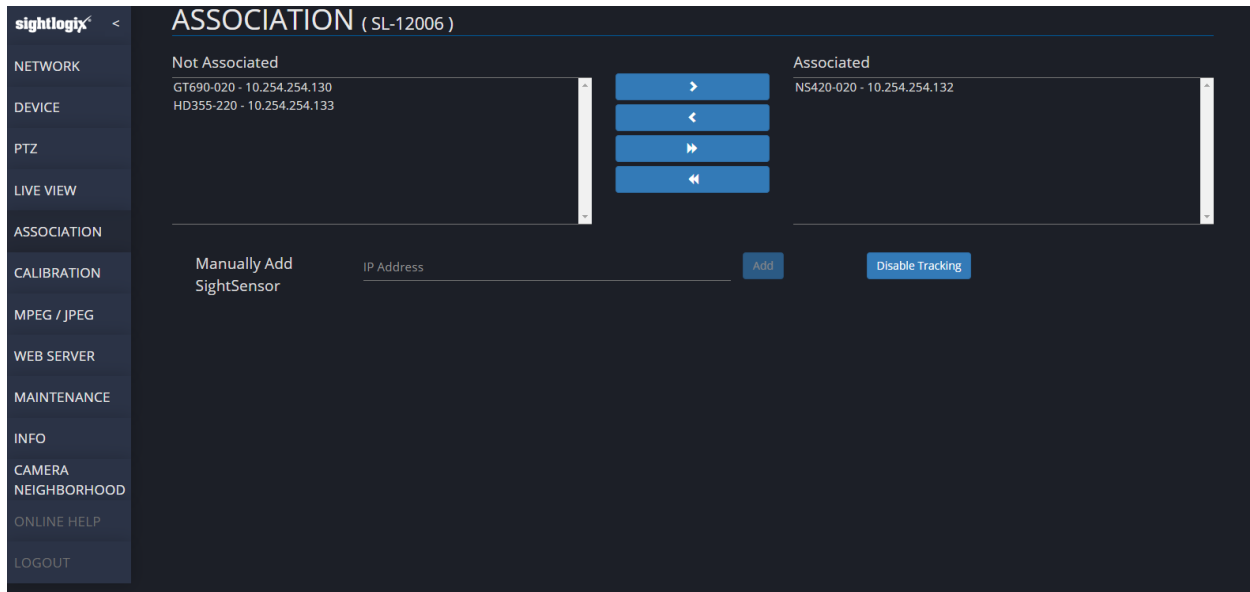
## LIVE VIEW PAGE



Live View is helpful for calibration and for a quick view of what the camera is currently seeing.

Click and drag on the Live View display to move the camera; use the mouse scroll wheel to zoom in/out.

## ASSOCIATION PAGE PARAMETERS



Associating a SightTracker PTZ with a SightSensor enables GPS target data to be relayed to the SightTracker PTZ so it can properly aim the PTZ camera to the initial target location.

**Not Associated** shows the list of configured SightSensors. Control-clicking and use the arrows to move between Not Associated and **Associated** columns.

**Manually Add SightSensor** allows you to enter the IP address of a SightSensor to add it manually.

**Disable Tracking** disables or enables SightTracker tracking. This is useful when calibrating to prevent the PTZ from moving.

## CALIBRATION PAGE – BASIC CALIBRATION PARAMETERS

Calibration Points	Latitude	Longitude	Height (meters)	Pan	Tilt
PTZ	40.32302	-74.634375	3.353		
Point 1	40.322643	-74.634584	0	49.39	-4.04

**Basic Calibration** - Used to associate a chosen calibration location on a site map with the position and orientation of the PTZ Camera.

**Show Map & Info** allows a site map jpeg to be loaded along with associated GPS information. Clicking this button shows the following options:

Info File Upload  SiteMap-745-Alexander.info

Map File Upload  SiteMap-745-Alexander.jpg

Left Corner		Right Corner	
Latitude (degrees)	40.323729	Latitude (degrees)	40.321789
Longitude (degrees)	-74.63647	Longitude (degrees)	-74.633452
Altitude (feet)	0	Altitude (feet)	0
Map Width (feet)	862.61	Map Height (feet)	743.11

**Map** shows the name of the map (from the name of the info file)

**Info File Upload** is used to upload a text file defining GPS coordinates of site map jpeg. The name of this file is used to name the site. The details of the file are used to complete the rest of the fields

**Use Map** stores the site map and hides the details.

**Calibration Points** table is used to select a row before placing pin on map to set GPS position.


**Import Position** button loads the current Pan/Tilt values from the PTZ Camera.

**Disable Tracking** button is used to Disable/Enable SightTracker PTZ tracking. This is useful when calibrating to prevent the PTZ from moving.

## CALIBRATION Page – Pairwise Calibration

### CALIBRATION (SL-12425)

[Basic Calibration](#)
[Pairwise Calibration](#)



Calibration Points	Image X	Image Y	Pan	Tilt
Point 1	478	137		
Point 2	10	295		
Point 3	548	392		

Refresh Image

SightSensor  
192.168.50.155  
192.168.50.14  
192.168.50.165  
192.168.50.173

Import Position

Clear Points

Disable Tracking

**Pairwise Calibration** associates three chosen Calibration points in the associated SightSensor image with the position and orientation of the PTZ Camera.

**Calibration Points** table is used to select a row before placing pin on map to set GPS position of the SightTracker PTZ or three calibration points.

**Refresh Image** button updates the background image by taking a snapshot from the camera's live scene.

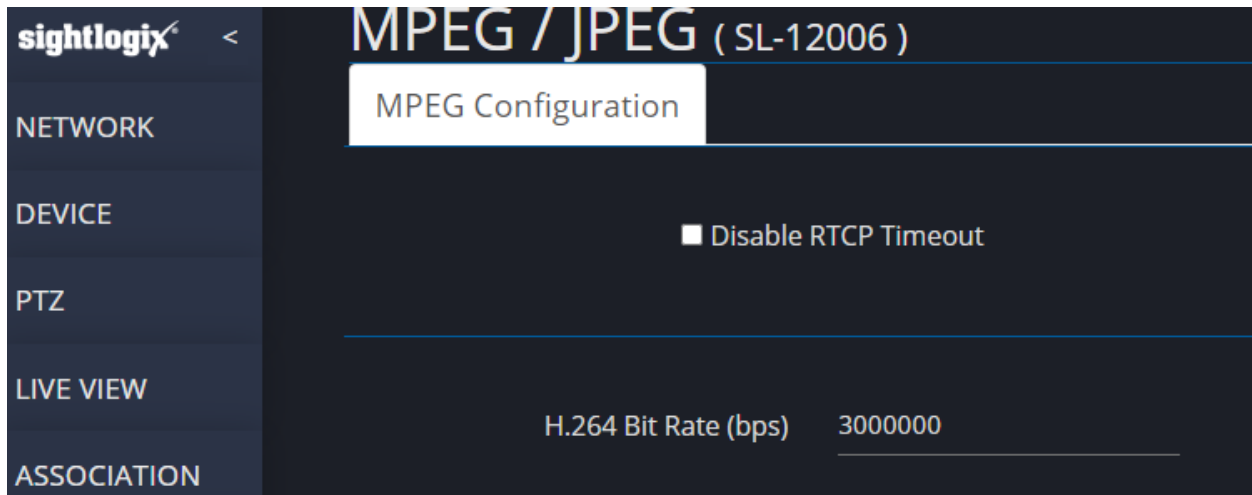
**SightSensor table** is used to select an associated SightTracker PTZ to complete the calibration.

**Import Position** button loads the current Pan/Tilt values from the PTZ Camera.

**Clear Points** button clears the pairwise points for the selected camera.

**Disable Tracking** button is used to Disable/Enable SightTracker PTZ tracking. This is useful when calibrating to prevent the PTZ from moving.

## MPEG / JPEG PAGE PARAMETERS



**Disable RTCP Timeout:** Checking this will cause the camera to keep streaming video over RTSP even if the client is not sending any control messages. By default, an RTSP video stream is shutdown if the client is silent for 60 seconds.

**H.264 Bit Rate (bps)** is used to set the streaming resolution. The PTZ's 5MP stream will be 3x this value. Expected format is DDDDD

## WEB SERVER PAGE PARAMETERS

**WEB SERVER ( SL-12006 )**

**Administrative Access**

Username

Password  ☐ Show Password Confirmation

☐ Hide Login Image

**Authentication**

Web Authentication Type  Web Server Mode

☒ HTTP 1.1 Pipelined Requests

**ONVIF Access**

Username

Password  Password Confirmation

☐ Persistent UUID for ONVIF Discovery

### Administrative Access

**Username** – enter a unique username to sign into this device (default is “root”)

**Password** – enter a unique password to sign into this device (default is “push2edg”)

**Password Confirmation** – enter a unique confirmation password to sign into this device (default is no confirmation password assigned)

**Hide Login Image** – Check this box if you want to hide the snapshot showing the device’s debug information from the login page.

### Authentication (Device will Reboot)

**Web Authentication Type** – Drop-down menu: Basic or Digest (default setting is “Basic”).

**Basic** – HTTP Basic Authentication (BA) implementation is the simplest technique for enforcing access controls to web resources because it does not require cookies, session identifiers, or login pages

**Digest**- digest access authentication is intended as a security trade-off, being stronger than Basic, but weaker than HTTPS

**HTTP 1.1 Pipelined Requests** – Enable HTTP 1.1 Requests check box (default is checked)

**Web Server Mode** – Choose “HTTP and HTTPS” (default) or “HTTPS Only” (encrypts all data between the SightSensor and your browser, **recommended**).

**Note!**

If you select “HTTPS Only” **or** if you enter "https://" in your web browser, you must also accept the SightLogix self-signed certificate. Refer to *Installing the SightLogix Self-Signed Certificate* in the Troubleshooting section of this guide for instructions.

## ONVIF Access

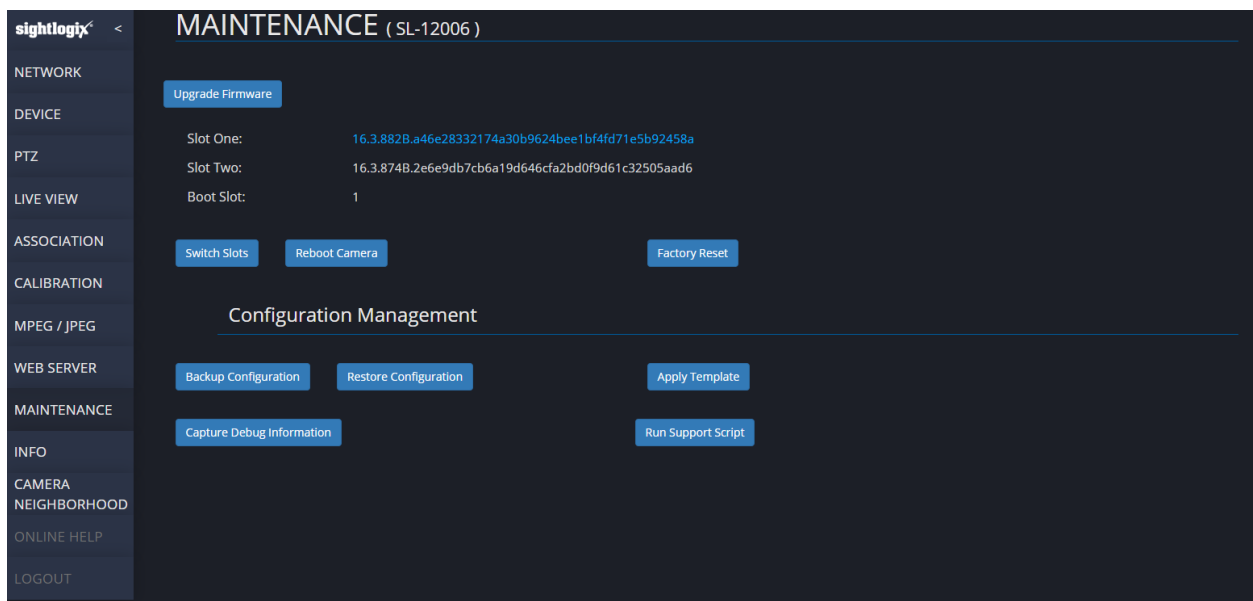
**ONVIF Username** – enter a unique username for ONVIF security (default is “service”)

**ONVIF Password** – enter a unique password for ONVIF security (default is “test1234”)

**ONVIF Password Confirmation** – enter a unique confirmation password for ONVIF security (default is no confirmation password assigned)

**Persistent UUID for ONVIF Discovery** – check the box to enable as needed.

## MAINTENANCE PAGE PARAMETERS



**Upgrade Firmware Box** – clicking on this box will bring up a window to select the location and file name of the new firmware to be loaded. Once selected click open and firmware will upgrade the standby slot (slot that is in white print), and immediately when finished loading will reboot the device to the newly loaded software (which will then be the blue text). To upgrade the other slot, repeat the process again.

*(Note: the device will reboot after the firmware update process and the video will be interrupted during that time.)*

**Slot one: and Slot two:** – contain separate copies of the firmware and the **Boot Slot:** indicates which slot's firmware is active (blue text) with the other slot being standby (white text)

**Switch Slots Box** – when selected will cause the device to reboot and run the firmware from the other slot.

**Reboot Camera Box** – when selected will cause the device to do a reboot but will not change the active firmware slot.

**Factory Reset** – causes all configuration, calibration and alarm policies to reset to factory default condition. IP Address, Gateway and Netmask data will not get reset.

**Backup Configuration Box** – clicking on this box will download the current device configuration to the download area of the browser. It will be downloaded with file name "sightlogix\_[Serial Number]\_[date-time].json", it can then be re-labeled and archived in case there is a need to restore the original configuration.

**Restore Configuration Box** – Clicking on this box will bring up a window to select the configuration file to be loaded to the device. The serial number in the backup file must match the device you are restoring to. If you are restoring a backup file to a different device, i.e. a replacement device with a different serial number, edit the file's second term using a text editor (like WordPad) so the serial number in the backup file matches the serial number of the device being restored. Any serial number information in the file's title is not relevant.

**Apply Template** – clicking on this box will bring up a window to select the configuration file template to be loaded to the device. This aids in setting up multiple devices that would want to use the same basic configuration. A template is made by setting up one device to the desired configuration then using that configuration file as the template. Unlike the normal Restore Configuration function the Apply Template function does not load device specific data like name, IP configuration, device description or GPS location, calibration data, policy information, and MPEG/JPEG channel description.

**Capture Debug Information** – downloads an archive with relevant information to aid SightLogix technical support to diagnose issues. This archive contains network specific information which may be privileged.

**Run Support Script** is used to run a custom script provided by SightLogix support.

## INFO PAGE PARAMETERS

The INFO page is reporting information and status about this device and as such there is no input of information on this page. The information is divided into three areas: INFO – general device information, VITALS – key operating information, and SETTINGS – status of device setting.

sightlogix <	INFO (SL-12006)			
NETWORK	Model	PTZ533-030	Description	
DEVICE	Uptime	14d, 22h, 20m, 38s	Camera Time	Thu Jan 5 15:59:50 2023
PTZ	Firmware Version	16.3.882B	Serial #	000012006
LIVE VIEW	Boot Code			
ASSOCIATION	Vitals			
CALIBRATION	Temperature (°C)	0	Current (amperes)	0
MPEG / JPEG	Heater (%)	Error	VMain (volts)	0
WEB SERVER	Clips Delivered	0	Clips Undelivered	0
MAINTENANCE	Motion Alarms	70756		
INFO	Settings			
CAMERA	Pan (degrees)	-150.23	Non Alarmed Objects Enabled	true
NEIGHBORHOOD	Tilt (degrees)	-20.92	Target Alarm Mode	Alarm
ONLINE HELP	PTZ Camera Status			
LOGOUT	Communication	ONVIF Address	undefined	

**Model** – lists the model number of the camera

**Description** – lists the **Camera Description** entry from the CAMERA Page

**Uptime** – indicates the uptime since the last boot

**Camera Time** – lists the date and time as provided by the NTP service as per the time zone setting of the device. (This information is only valid if NTP is provided)

**Firmware Version** – lists the firmware version that is currently operating the device

**Serial #** - list the serial number of this device

**Boot Code** – lists the status of the last boot of the camera (useful for trouble shooting)

## VITALS

**Temperature (Celsius)** – lists the current internal temperature of the camera (this is typically about 10 to 12 degrees higher than the external temperature)

**Current (amperes)** – indicates the current draw in amperes of the internal 5 vdc supply voltage

**Pressure (kiloPascals)** – indicates internal pressure of the camera (only relevant to camera models that are pressurized)

**Heater (%)** – the level that the internal heater is working (Heater requires 24v power to camera to function) and is controlled automatically by monitoring the internal camera temperature

**VMain (volts)** – measures the voltage of the main internal 5-volt power source

## SETTINGS

**Pan (degrees)** – device using this setup process is assumed to have a zero-degree heading looking straight out from device center. This parameter is only meaningful Geospatially when device is setup using full geo-calibration.

**Non Alarmed Objects Enabled** – indicates the status of check box on TRACKER page to report Nonalarmed Objects (true = box checked)

**Tilt (degrees)** – lists the degrees of forward device tilt (same as value listed on the CALIBRATION page)

**Target Alarm Mode** – states the status of the Target Alarm Mode as specified on the TRACKER page

**PTZ Camera Status** – shows the status of the ONVIF PTZ Camera controlled by the SightTracker PTZ.

## CAMERA NEIGHBORHOOD PAGE PARAMETERS

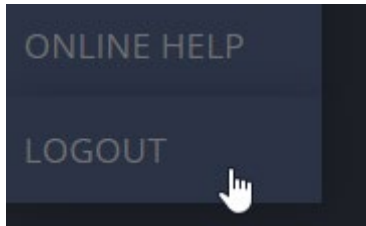
CAMERA NEIGHBORHOOD ( SL-13294 )					
SN	IP	Type	Sensor	Uptime	Version
12006	192.168.50.40	DHCP	NS62-320	01H 18M	15.7.289
12007	192.168.50.41	DHCP	NS62-320	15.7.289	15.7.289
12008	192.168.50.42	DHCP	NS62-320	23H 27M	15.7.289
12009	192.168.50.43	DHCP	NS62-320	75H 27M 12M	15.8.80
12010	192.168.50.44	DHCP	NS62-320	75H 27M 27M	15.7.174824
12011	192.168.50.45	DHCP	NS62-320	17H 17M 28M	15.8.70
12012	192.168.50.46	Static	NS62-320	02H 42M	15.8.87
12013	192.168.50.47	DHCP	Composite	100H 13M 12M	15.7.289
12014	192.168.50.48	DHCP	NS62-320	86H 27M	15.7.289
12015	192.168.50.49	DHCP	NS62-320	07H 18M	15.7.289
12016	192.168.50.50	DHCP	NS62-320	02H 17M	15.8.80
12017	192.168.50.51	Static	NS62-320	17H 07M 18M	15.8.80
12018	192.168.50.52	DHCP	NS62-320	24H 23M 23M	15.7.273
12019	192.168.50.53	DHCP	NS62-320	23H 18M	15.7.289
12020	192.168.50.54	Static	NS62-320	27H 05M 28M	15.8.29
12021	192.168.50.55	Static	Dark Thermal vis. 30 Degrees	75H 27M 28M	15.8.101

Provides a list with selected details of all the SightLogix device types connected directly to this local network. This can be handy to discover other devices.

## ONLINE HELP

Selecting this page will take the web browser directly to the SightLogix Support Portal if the internet is accessible from the local network.

## LOGOUT



Selecting the logout page will terminate the browser session and log the user out of the device. Note that WebConfig will auto-logout a user after one hour of inactivity.



## TROUBLESHOOTING AND MORE INFORMATION

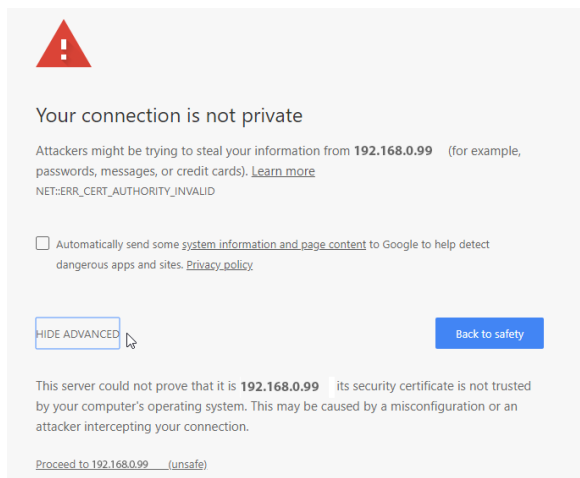
## FACTORY REST PROCEDURE

To reset your SightTracker PTZ to factory defaults, do the following.

- Press and hold the reset switch on the wire harness
- Power on the PTZ
- Wait until the LED on the bottom of PTZ blinks the reset pattern
- Release the reset switch while LED is blinking pattern.

## INSTALLING THE SIGHTLOGIX SELF-SIGNED CERTIFICATE

SightLogix devices are shipped with a self-signed certificate that SightLogix has secured. If you access WebConfig using HTTPS, you may receive a security warning until you install the SightLogix self-signed certificate in your browser, as shown below.



**Security Warning - Chrome**

### This site is not secure

This might mean that someone's trying to fool you or steal any info you send to the server. You should close this site immediately.

✓ Close this tab

🔍 More information

**Your PC doesn't trust this website's security certificate.**

Error Code: DLG\_FLAGS\_INVALID\_CA

⚠ Go on to the webpage (not recommended)

**Security Warning – Internet Explorer**



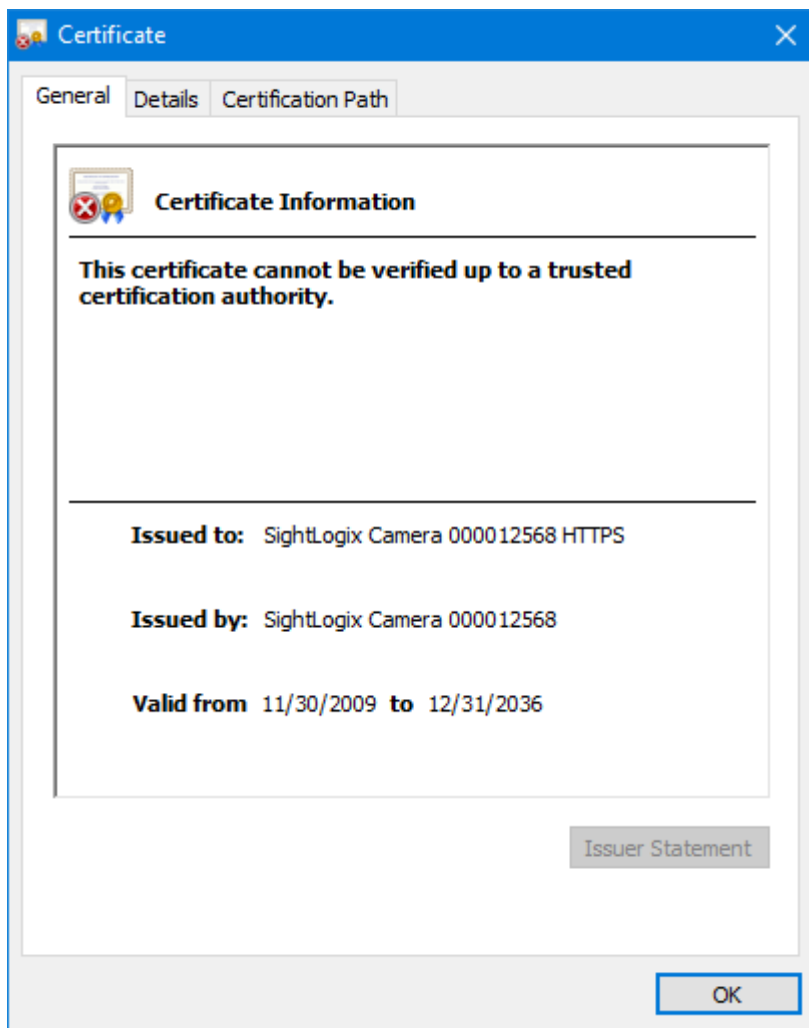
### Note

Microsoft Edge does not allow you to add a self-signed certificate. If you are using Edge to access WebConfig and receive a warning like the one above, click the three-dot menu on the upper right of the browser, select "Open with Internet Explorer" and follow the instructions below.

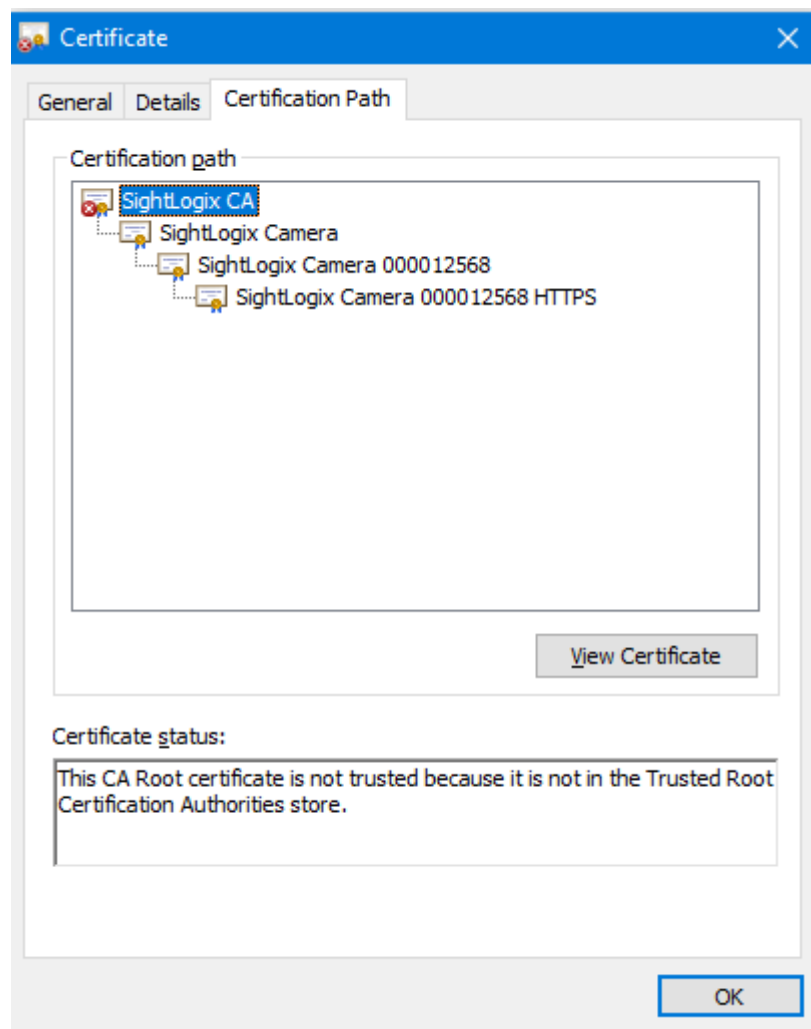
- Browse to WebConfig using HTTPS (e.g., <https://192.168.0.99>)
- If you receive the security warning shown above, proceed to WebConfig:
  - In Chrome, click "Advanced" and "Proceed to https://<ip address> (unsafe)"

- In Explorer, click “Go on to the webpage (not recommended).”
- Web Config opens
  - In Chrome: Right-click “Not Secure” in the upper left
  - In Explorer, right-click “Certificate Error” on the upper right.
- View the certificate:
  - In Chrome, Click “Invalid”
  - In Explorer, click “View Certificates”

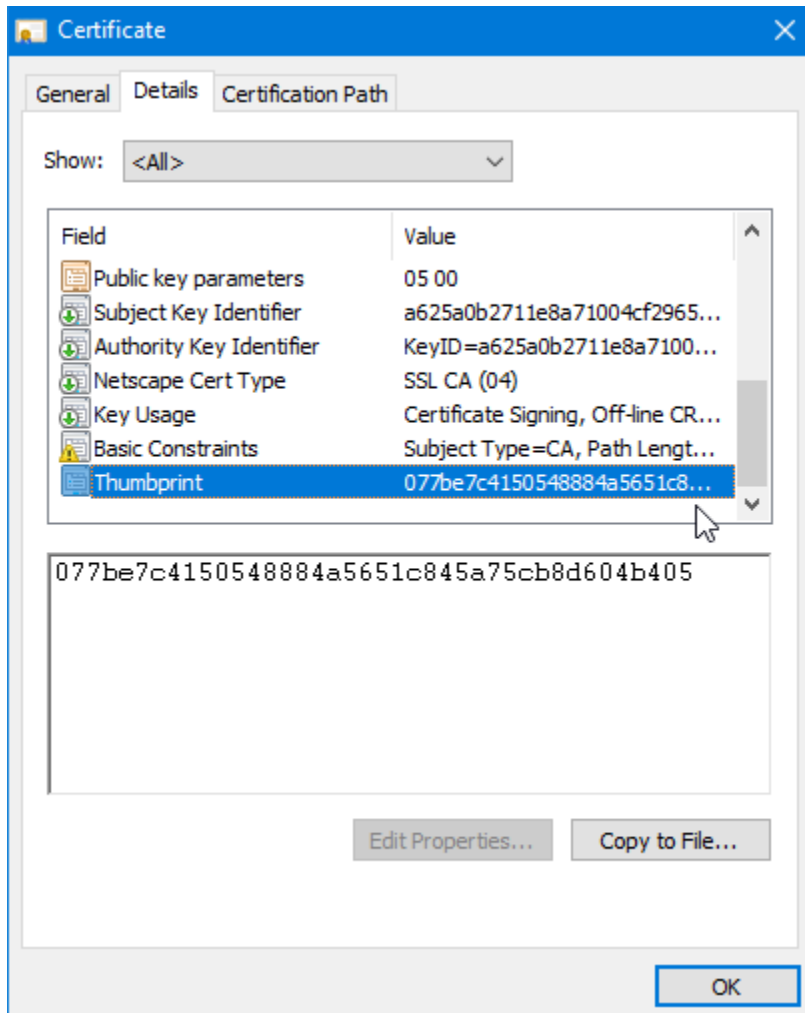
The Certificate window opens.



- Click Certification Path tab, highlight the SightLogix CA, and click “View Certificate.”



- Click “Details” and scroll to Thumbprint, as shown.

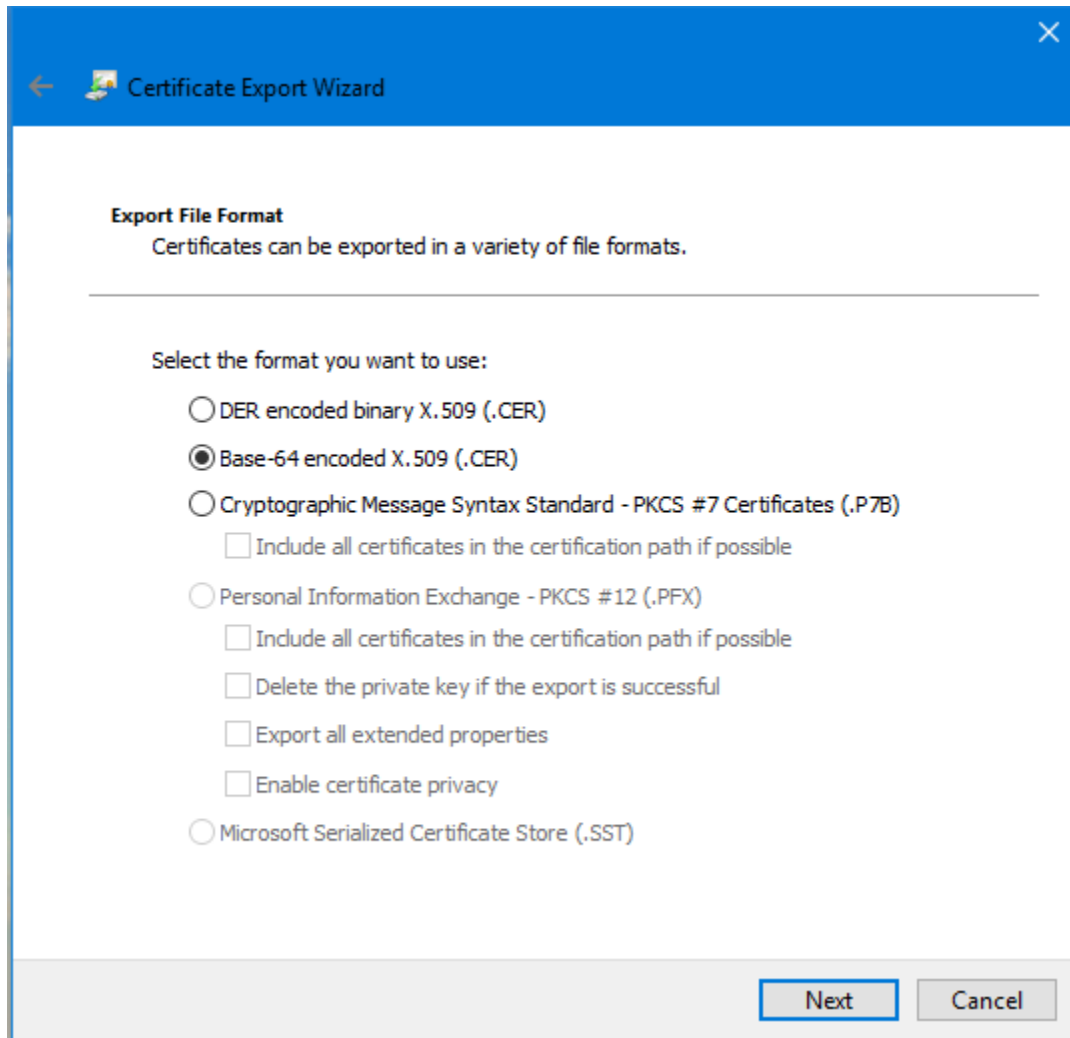


- Confirm that the thumbprint matches the SightLogix thumbprint:

**07 7B E7 C4 15 05 48 88 4A 56 51 C8 45 A7 5C B8 D6 04 B4 05**

- Click “Copy to File...”
- The Certificate Export Wizard opens. Click “Next”

- Choose Base-64 encoded x.509 (.CER) and click “Next”

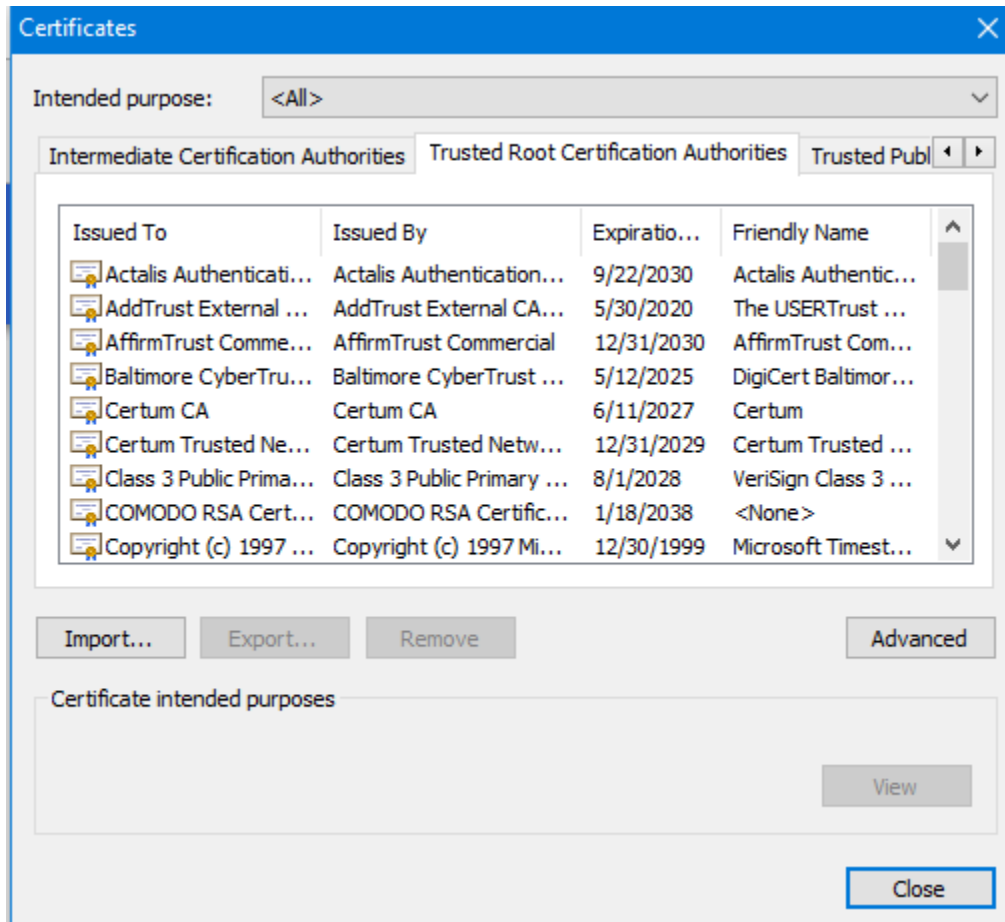


- Name the file (for example, SightLogix CA) and save to a location on our computer, such as your Downloads directory.

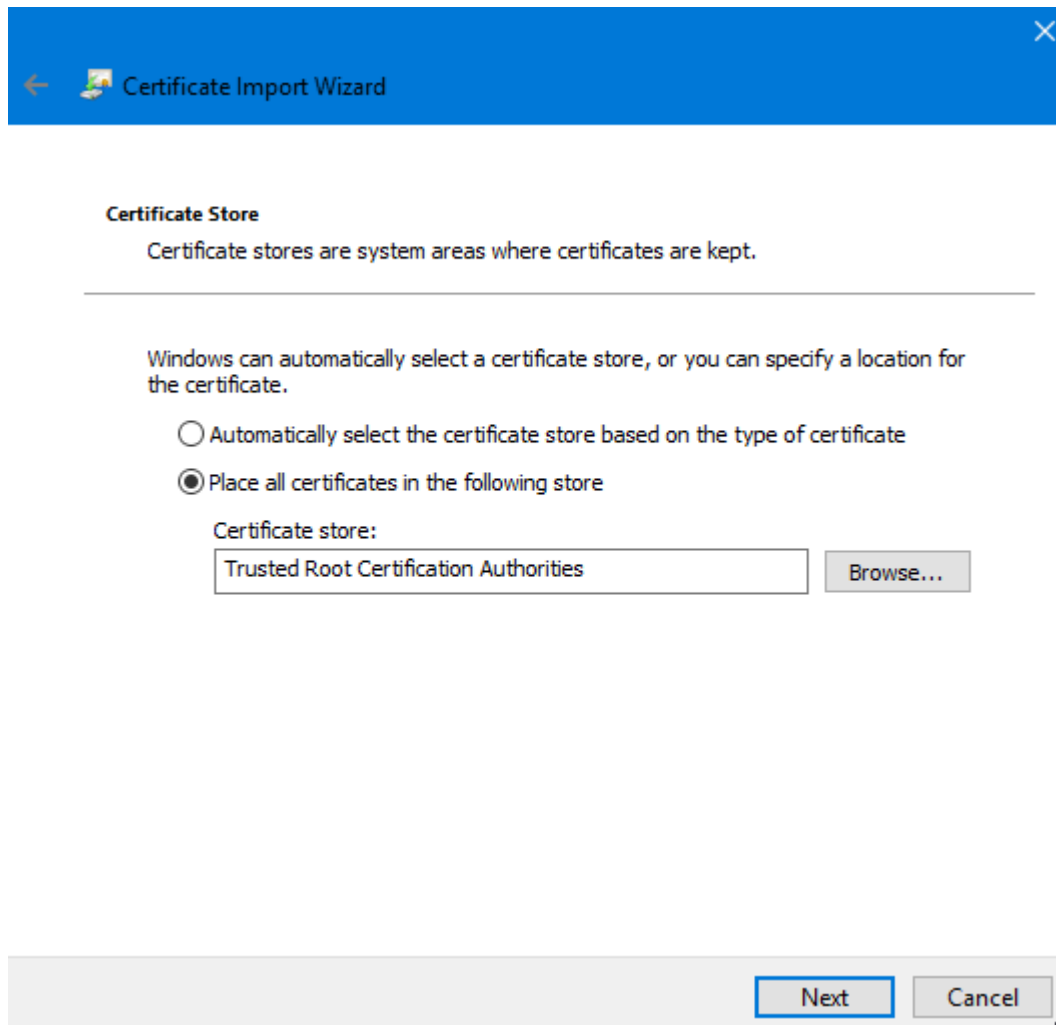
- Next, import the certificate into your computer's Trusted Root Certificates.
  - In Chrome, right-click *Not Secure* in the upper left of the browser and choose *Site Settings*, then scroll to Manage HTTPS/SSL certificates and settings
  - In Internet Explorer, click "Settings" -> "Internet Options" -> "Content" -> "Certificates"

The Certificates window opens

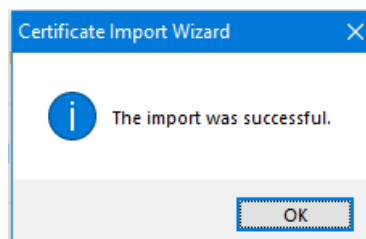
- Click the Trusted Root Certification Authorities tab



- Click "Import..."
- The Certificate Import Wizard opens. Click "Next" and browse to the location where you previously saved the SightLogix certificate.



- Choose “Place all certificates in the following store” and confirm that “Trusted Root Certification Authorities” is selected, as shown.
- Click “Next” and then click “Finish”
- Click “Yes” to the Security Warning. Then click “OK” to close the Import Wizard



- **Close your browser completely.**
- Restart your browser and enter the IP address of the SightSensor, using https (for example, <https://192.168.0.99>).
- You will see a lock icon indicating a secure connection.

## FINDING MORE INFORMATION

- Visit the SightLogix Support Portal for additional resources: <http://portal.sightlogix.com/help>

## Contact SightLogix Support

Visit: <http://portal.sightlogix.com/help>

Call: +1 609.951.0008, option 2

Email: [support@sightlogix.com](mailto:support@sightlogix.com)

## **MOUNTING AND DIMENSION DIAGRAMS**